



**NWCG Smoke Committee
December 2013 Activity Update**



Outreach and Messaging

- Everyone here should be able to access our SmoC Lessons Learned Beta site.
- SmoC call notes are posted on Wildland Fire Lessons Learned website in our SmoC site.

Smoke Advisor for Fuels Committee Interagency Complexity Analysis -Dave Mueller

- Dave Mueller & Fuels Management Committee—tasked fire-use subcommittee to review the interagency complexity analysis process & the analysis to see if process needs to be revised &/or a new process developed to determine Rx fire complexity. Dave's goal—Give us the information & solicit if we want to be included as a community or ID one liaison for this advisory process.
- Task team members have been identified—Trying to develop a small cadre of advisory people. The complexity analysis for Rx fire has a smoke mgt element, so we wanted to be sure to include SmoC as an advisory to review the process and help out with any smoke recommendations (i.e. simple revisions, or whole new process).
- The due date is the end of the 2014 calendar year.
- People: Co-chairs fuels mgt-Dave Mueller and Andy Bundshuh NPS. Other members are: Stu Hoyt (FS), Bill Grauel BIA, Rance Marquez (AZ Fuels), Bret Fay FWS, Mike Ward NPS, Jeff Arnberger BLM, Dave Obercast (sp?) DOI, James Berman (sp?) DoD. Still looking for a TNC rep, state rep, and FS administrator rep.
- Stu has served as the chair of SmoC training subcommittee & has a strong background in smoke issues. SmoC members could be interested in serving in advisory capacity including some from the air regulatory side who would be interested in the outcome of the complexity results (i.e. who does what kind of burn and what the smoke outcomes for these would be).
- Dave—reach out to Stu Hoyt—talk to committee next week to see if they want more SmoC reps.

Linking SmoC to the FMC

- SmoC should engage with FMC on overlapping subject project, specifically comments to the Interagency Wildland Fire Weather Station Standards & Guidelines, the Smoke Management Guide Revision, the RX-410 Revision process, the NRC document/bp on resource advisors, personnel exposure training, and funding opportunities for projects like the Smoldering Potential Project.
- Frankie Romero will be bringing progress report to FMC on mixing heights.
- Develop some discussion items in January for a dual meeting with SmoC and FMC February 26th.

NWCG Business

- Pete is on committee for all-Chairs meeting w/NWCG this spring. Would like feedback from SmoC on issues e.g. Website, impacts of wildfire smoke, & other issues.
- Rx Fire Guide has been published on NWCG webpage. Substantial smoke & AQ section.
- GIS operating procedure for incident command review. Determined no crossover with ARA or emission inventory. Comments due 12/1/2013.
- ESP Project - not currently funded—will take a small amount of money to move forward.
 - Project useful in reducing mop-up, considering smoldering potential and impacts to downwind areas (benefits to air community, State forestry, DoD).
 - 2 more wildlife refuges are interested in adding monitoring stations—currently lack funding (Gary talked to Craig at Dismal Swamp and the Okefenokee Refuge Botanist).
 - Funding obstacle is lack of interest/applicability to the western US.
 - JFSP supported for one grant term, not sure if they will support a second one.
- Anything relating to RX-410 or statewide smoke training assessment projects sidelined for now. Will remain in contact with Deb Fleming/Training Branch. Review timeline is flexible.
- Funding—5K to support an ARA workshop in 2014.



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- Review of the Interagency Wildland Fire Weather Station Standards & Guidelines.
 - Comment Gary: FMC should review Superfog/forecasting weather service tools. Reducing the standards created concerns for those working in humid climates.
 - Comment Mark: Made some revisions but saw no major changes in the new document nor has same concerns that Gary does.
 - Request to review a mark-up version of the Interagency Wildland Fire Weather Station Standards & Guidelines. Concern regarding treatment of missing data values.
- The Training Committee is drafting a BP for OWDC's February meeting regarding the need for a working group (subcommittee under OWDC) on the resource advisor positions (READ) to set up IQCS qualifications. Pete will create a dialogue at the NWCG all chairs meeting.

JFSP Smoke Science Plan (SSP)

- Doug & Al want SmoC to provide short list (bullet form) of research topics under the SSP particularly the area by the end of this year.
- Cindy is formulating research needs for funding FY2015 Funding Opportunity Notice (FON) in topic of "Smoke and Populations" w/emphasis on AQ/public health warning system during times of large wildfires. At the ISS Cindy heard about entities that are creating public health warning systems (e.g. Canada) and this is new since the SSP was written.
- Doug, Al and Cindy need to provide ideas to the JFSP Board by the end of January.
- Ed – JFSP Schedule – JFSP Board meets 3 times/yr. First meeting will be the last week in March – looking at first draft of FONs. June meeting – second draft. At that point it's difficult to make changes. At the August meeting they will finalize the FONs.
- Pete – are we talking about exposure of fire fighters?
 - Ed – it can be both. Exposure to fire line workers is out there right now.
 - Cindy – Joe Domitrovich has a funded project looking at exposure to FF's and public.
 - Proposals submitted regarding public exposure to large fires (focus on urban centers).
- Pete – **Upcoming issue/need/Topics: next generation air monitoring equipment and how we respond to it** (Social Science aspect). People can monitor their own respiration of smoke. Also need to look at the state of the science of this monitoring equipment. Potential role in basecamp. Potential role for online use.
- Pete – **another topic that the ARA and AQ people/community face – how does a person secure their house from smoke?** Have we evaluated the persistence of PM1 etc in homes? Do they need to think of evacuation? How does this link w/ indoor AQ concerns. Example, swamp coolers in the SW, does it help scrub the PM or do people need to turn them off? Also, some are large systems, such as used in hospitals. Linkage to indoor air quality that we have not touched.
 - Mark – OSHA standards of PM4.5 vs NAAQS PM2.5, what are the ramifications of using one versus other standard. In the Yarnell Fire report OSHA was talking about PM4.5 and saying not to put fire fighters in smoke.
 - Cindy/Pete – Joe Domitrovich is doing a lit review of some of this.
- Gary – can we move **Estimated Smoldering Potential (ESP)** along on this? Pete – yes. Triggers 2 things: 1) role of ESP and loss of carbon (as directed by the President – need to protect our carbon), linkage to satellite sensors, 2) risk potential in terms of AQ impacts.
- Cindy – Is ESP related to consumption in the deep organic soils? Gary – yes, they are related and he was disappointed that organic soils weren't really addressed by Roger Ottmar and Susan Pritchard in their webinar today. It's a hard sell but has a tremendous impact.
 - Ed – if you want to write this up, don't simplify it—not just AQ—also fuels, so it's a combination topic and that is the compelling thing.
- Susan – Would prescribed fire vs. wildfire trade-offs/evaluation be a topic?
 - Pete – yes and emphasize the carbon aspect to it.



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Planned Webinar with EPA on AirNow Tech recently Version 2 Updates (SmoC, ARA and support communities and FLM air programs) - Scheduled for January 16

Subcommittee Report-outs:

Smoke Technical Topics

- SMG call tomorrow- progress is being made. Need to get chapters in ASAP for 508 review.

Smoke Training

- Quarterly NWCG training—updating courses need SmoC input. Will discuss on next call.
- Have half of the appendices for the transportation safety workbook rest by end of the month.
- Need to get WESTAR & check cross-over with them. Finalizing transportation safety short video.

Smoke Managers

- Call in late January—no other information to report.

Round Robin Topics

- Allan Long asked Gary to do a presentation on super fog and transportation safety. Pete is presenting on smoke management programs for the southern prescribed fire consortia.
- Table Mountain Fire/Gary—over 1k acres—heavy smoke producer. Fire weather intelligence there for IMET. Local forecasting office provided PFW AFM Activity Planner combined w/GSP and local forecasts plus gridded data. These tools provided information that would have taken a week otherwise. Need to get the tools incorporated nationwide. Local NWS must take necessary steps to offer the tools when needed.
- Mixing Height Issue/Gary—The WRCC supports and recommended methods for mixing height calculation. Currently based on Holsworth-Miller based on dry climate. The Stohl method addressed dry and humid climates. Turbulent Kinetic Energy (TKE) was evaluated and recommended by WRCC. Performs well for Rx-fire planning. WRCC will present case to utilize TKE to determine mixing heights to NWS.
- Mike spoke with Rick Graw/OR regarding opening eligibility to federal agency meteorologists IMET positions. Mark to follow up.
- Amy Royden-Bloom's replacement is Phis Assmus—Agriculture and Global Warming committees. Has expressed interest in maintaining a good relationship w/SmoC & would like to have Pete do BSMP presentation for the committees. Next GW call—June 11 (2-3:30 eastern) and Ag call—June 17 (2-3 eastern).
 - Mark – what about the other competing group with NACAA? Didn't they have a meeting? Pete doesn't know but had been in contact with them. Evidently Mike George heard about a meeting.
- You can still request NWS HYSPLIT trajectories for spot weather forecasts. The capability has not been added to the production systems (Robyn was having logistical problems with that). Pete suggested having Robyn on a call to give us an update on NWS products.
- Cache Monitors—Most FS regions have in-house monitors and NPS – go locally and regionally. Might be able to get the monitors from ROSS –trying to figure these logistics but this will be invisible to whoever is requesting the monitors.
- Gary is trying to get in contact with Tim Brown re: Mixing height issue and recommends this will be a topic for Pete to take with him to the All-Chairs meeting.
- Gary – Teaching S590 with Miriam Rorig in January.
- Susan is teaching Rx-510 (Adv Fire Effects) next month.
- Mark – Tim is in Boise at the Fire Weather Subcommittee meeting.
- The Webinar by Roger Ottmar and Susan Prichard was recorded.